Communication and education

Take the two risk books and look up Weinberg in nuclear power book. Look up Slovic diagram

General

NRC report – improving risk communication

Main points
Delta often on values, not facts --e.g., is it fair

Honesty is the best policy
Once credibility is lost, very hard and often impossible to regain trust

Do not want a "public talking" but a public hearing

2-way communication

Often reps sent out do not know enough to answer questions. It is okay occasionally to say don't know, but not often.

PRA – well accepted by NRC and nuclear industry, but another mystery to most people. What does 10-4 core damage probability mean?

When a threat comes up, public wants clear answers – is it safe to drink the milk? Eat the meat? Inherent in the answer -- what it safe?

Characterization study:
Major points:

Recent MIT study (Moniz):
View of public attitude:
But grant in footnote:

Other polls have different view – Gene Rosa has worked in this field. His views, I believe, correspond to those of the MIT study. The polling done for the nuclear industry is by Ann Bisconti, who has different results.

It is factually correct:
- No new orders for nuclear plants in the US for a quarter century.
- Pressures in Europe to close out nuclear power: Germany and Sweden
- Japan – a growth country, but 17 npps are shut down by regulatory body
- Canada only recently recovering from shut down of eight CANDUs

I have enough difficulty understanding the cultures and politics in the US. I do not pretend to understand those of other countries.

May Q's:

How better to communicate the benefits and risks of the nuclear enterprise as it inters into the second half-century? First should try to get consensus on what ARE the benefits and risks.

Should risk evaluation and communication incorporate the potential nuclear contribution to such problems as global warming, drinkable water production, and future sources of transportation energy? Of course, but may not be, and probably will not be, enough.

Is a new approach to waste issues needed? Decide what are the problems to be solved, rather than look at a technology in search of a problem.

In a 1990's American political campaign, the slogan was "It's the economy, stupid." In nuclear power, I believe it is the economics.

At least in the US, there are several groups that need to be convinced that growing nuclear would be an overall positive:

(1) Utility directors, CEOs, and strategic planning staffs. The will look primarily, if not exclusively, at the economics:
- How hard will it be to get regulatory approval
- How long will it take to build (time is money)
- What will be the cents/kwhr for electricity produced? Currently, life cycle cost less important than initial operating electricity price.

(2) Financial community. NPPS are expensive and the financial community must be willing to support raising the necessary funds.
(3) The political world. Congress can help/hinder. EPA can help/hinder. As CA showed, states can help/hinder. (I gather this also has been shown in Germany.)
(4) The general public: certainly it will help if the public supports and the public strongly opposed is a definite negative. But this is not clear. Weinberg's elites.

Opposition to nuclear power at least from
- Environmentalists, who see rad waste an intractable "forever" problem an believe that renewables and conservation are a far better approach to addressing global warming than is an expansion of nuclear power.
- Those concerned about nuclear proliferation. Seen in the case of Iran, where US is opposed to Russia' aid to building a npp which can/will be used to assist in an nuclear weapons program

As advocates of expanding nuclear power push for reprocessing and fast reactors, the non-proliferation community raises concerns about a "plutonium economy".

Real issues: “education” must begin with developing a better case than currently has been done. It also must include dialogue, which often has been absent, at least in the US>